APPENDIX 5 – OLD GROWTH CHARACTERISTICS OF TREATED STANDS

Description of data sources for the attached summary sheets

Old Growth Characteristic*	Data Source	Comment
Minimum Age of Large Trees	FSVeg Report 16	Trees per acre weighted averages ages of trees with nonzero, non-NULL measurements in largest size classes (20.1-24 in, 24.1-28 in, etc.)
Minimum Number of Trees per Acre Larger than a Specified Diameter	FSVeg Report 16	Average number of trees per acre larger than the specified minimum diameter. Standard error of that average.
Minimum Basal Area of Trees ≥ 5" dbh (Ft^2/Acre) [4/ 5/]	FSVeg Report 16	Average basal area per acre of trees over 5" dbh. Standard error of that sum.
DBH Variation in Trees ≥ 9" dbh [2/]	FSVeg Report 26	Sum of trees per acre over 9" dbh by 4-inch dbh groups to show diameter distribution.
Percent Dead/Broken Tops in Trees ≥ 9" dbh [1/]	FSVeg Report 16 12/1/06 Draft R1 Old Growth Report	Trees per acre with dead/broken tops from Draft R1 report divided by total live trees per acre from FSVeg Report 16
Probability of Down Woody ≥ 9" dbh [2/]	FSVeg Report 20	Based on number of pieces over 9" diameter intersected on transect. Example: "3 of 10 plots with pieces" can be interpreted as a 30 percent probability of intersecting a 9"+ diameter piece on any random 100-foot transect.
Percent of Trees ≥ 9" DBH With Decay [1/]	FSVeg Report 16 12/1/06 Draft R1 Old Growth Report	Trees per acre with decay from Draft R1 report divided by total live trees per acre from FSVeg Report 16
Number of Snags ≥ 9" DBH Per Acre	FSVeg Report 16	Recent and older dead trees over 9" dbh per acre.
Number of Canopy Layers [3/]	Stand observations write-up by inventory crew	

Old Growth Monitoring Stand Summary

Stand ID: 32806003
Initial Exam Date: Nov 1981
Monitoring Exam Date: Aug 2006
Treatment: 2000 Ecosystem Burn
Habitat Type:262 Forest Type: PP
Old Growth Habitat Type Group*: B Old Growth Type*: 1

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam	2006 Monitoring Exam
Minimum Age of Large Trees	170	177-231	207-263
Minimum Number of Trees per Acre Larger than a Specified Diameter	8 tpa ≥ 21" dbh	9 ± 2	6 ± 2
Minimum Basal Area of Trees ≥ 5" dbh (Ft^2/Acre) [4/ 5/]	60	104 ± 13	72 ± 14
DBH Variation in Trees ≥ 9" dbh [2/]	M	43 tpa 9-12.9" dbh 11 tpa 13-16.9" dbh 4 tpa 17-20.9" dbh 3 tpa 21-24.9" dbh 7 tpa 25"+ dbh	34 tpa 9-12.9" dbh 13 tpa 13-16.9" dbh 2 tpa 17-20.9" dbh 2 tpa 21-24.9" dbh 4 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees ≥ 9" dbh [1/]	12 3-23	0% 0/66	3% 1.7/55
Probability of Down Woody ≥ 9" dbh [2/]	L – M	No Data	Avg 1.3 pieces/transect 7 of 10 plots with pieces
Percent of Trees ≥ 9" DBH With Decay [1/]	5 0-11	0% 0/66	0% 0/55
Number of Snags ≥ 9" DBH Per Acre	6 0-22	4	9
Number of Canopy Layers [3/]	Single		Multiple

1/ These values are not minimum criteria. They are the range of means for trees ≥9" DBH across plots within forests, forest types, or habitat type groups.
2/ These are not minimum criteria. They are Low, Moderate, and High probabilities of abundant large down woody material or variation in diameters based on stand condition expected to occur most frequently.
3/ Not a minimum criteria. Number of canopy layers can vary within an old growth type with age, relative abundance of different species and successional stage.
4/ In Old Growth Type 3, 60 ft^2 applies to habitat type group E for LP, 70 ft^2 of basal area applies to habitat type group C for LP and habitat type group H for ES,AF,WBP, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 3 .
5/ In Old Growth Type 5, 70 ft^2 applies to habitat type group H for SAF, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 5 .

* Green, P., Joy, J., Sirucek, D., Hann, W., Zack, A., Naumann, B. 1992 (*errata corrected 02/05*). Old-Growth Forest Types of the Northern Region. In Our Approach to Sustaining Ecological Systems. USDA Forest Service, Northern Region, Missoula MT

Old Growth Monitoring Stand Summary
(Page 1 of 2 for this stand)

Stand ID: 33202004 (Parent Stands 33202001, 33202002, 33202003, 33202004)
Initial Exam Date: Aug 1985, Aug 1985, Aug 1985, Sept 1985 respectively
Monitoring Exam Date: Jul 2006
Treatment: 2000 Improvement Cut
Habitat Type:262 Forest Type: DF
Old Growth Habitat Type Group*: B Old Growth Type*: 1

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam 33202001	Initial Exam 33202002
Minimum Age of Large Trees	170	103-152	121-188
Minimum Number of Trees per Acre Larger than a Specified Diameter	8 tpa ≥ 21" dbh	7 ± 2	7 ± 3
Minimum Basal Area of Trees ≥ 5" dbh (Ft^2/Acre) [4/ 5/]	60	94 ± 17	120 ± 17
DBH Variation in Trees ≥ 9" dbh [2/]	M	42 tpa 9-12.9" dbh 13 tpa 13-16.9" dbh 3 tpa 17-20.9" dbh 3 tpa 21-24.9" dbh 3 tpa 25"+ dbh	57 tpa 9-12.9" dbh 24 tpa 13-16.9" dbh 15 tpa 17-20.9" dbh 5 tpa 21-24.9" dbh 1 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees ≥ 9" dbh [1/]	12 3-23		
Probability of Down Woody ≥ 9" dbh [2/]	L – M	No Data	No Data
Percent of Trees ≥ 9" DBH With Decay [1/]	5 0-11		
Number of Snags ≥ 9" DBH Per Acre	6 0-22	19	8
Number of Canopy Layers [3/]	Single		

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3/ Not a minimum criteria. Number of canopy layers can vary within an old growth type with age, relative abundance of different species and successional stage.
4/ In Old Growth Type 3, 60 ft^2 applies to habitat type group E for LP, 70 ft^2 of basal area applies to habitat type group C for LP and habitat type group H for ES,AF,WBP, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 3 .
5/ In Old Growth Type 5, 70 ft^2 applies to habitat type group H for SAF, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 5 .

* Green, P., Joy, J., Sirucek, D., Hann, W., Zack, A., Naumann, B. 1992 (*errata corrected 02/05*). Old-Growth Forest Types of the Northern Region. In Our Approach to Sustaining Ecological Systems. USDA Forest Service, Northern Region, Missoula MT

(Page 2 of 2 for this stand)

Stand ID: 33202004 (Parent Stands 33202001, 33202002, 33202003, 33202004)
Initial Exam Date: Aug 1985, Aug 1985, Aug 1985, Sept 1985 respectively
Monitoring Exam Date: Jul 2006
Treatment: 2000 Improvement Cut
Habitat Type:262 Forest Type: DF
Old Growth Habitat Type Group*: B Old Growth Type*: 1

Old Growth Characteristic*	Initial Exam 33202003	Initial Exam 33202004	2006 Monitoring Exam
Minimum Age of Large Trees	146-165	141-200	130-280
Minimum Number of Trees per Acre Larger than a Specified Diameter	7 ± 4	7 ± 2	6 ± 3
Minimum Basal Area of Trees ≥ 5" dbh (Ft^2/Acre) [4/ 5/]	147 ± 19	133 ± 16	56 ± 13
DBH Variation in Trees ≥ 9" dbh [2/]	54 tpa 9-12.9" dbh 34 tpa 13-16.9" dbh 15 tpa 17-20.9" dbh 5 tpa 21-24.9" dbh 2 tpa 25"+ dbh	43 tpa 9-12.9" dbh 34 tpa 13-16.9" dbh 13 tpa 17-20.9" dbh 5 tpa 21-24.9" dbh 3 tpa 25"+ dbh	0 tpa 9-12.9" dbh 13 tpa 13-16.9" dbh 9 tpa 17-20.9" dbh 4 tpa 21-24.9" dbh 2 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees ≥ 9" dbh [1/]		5% 4.9/98	5% 1.3/27
Probability of Down Woody ≥ 9" dbh [2/]	No Data	No Data	Avg 1.0 pieces/transect 5 of 10 plots with pieces
Percent of Trees ≥ 9" DBH With Decay [1/]		6% 6.3/98	6% 1.5/27
Number of Snags ≥ 9" DBH Per Acre	8	20	13
Number of Canopy Layers [3/]			Multiple

Old Growth Monitoring Stand Summary
(Page 1 of 2 for this stand)

Stand ID: 33202009 (Parent Stands 33202001, 33202002, 33202003, 33202008, 33202009)
Initial Exam Date: Aug 1985 for all parent stands
Monitoring Exam Date: Jul 2006
Treatment: 2000 Shelterwood Preparatory Cut
Habitat Type:261 Forest Type: DF
Old Growth Habitat Type Group*: B Old Growth Type*: 1

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam 33202001	Initial Exam 33202002	Initial Exam 33202003
Minimum Age of Large Trees	170	103-152	121-188	146-165
Minimum Number of Trees per Acre Larger than a Specified Diameter	8 tpa $\geq$ 21" dbh	7 $\pm$ 2	7 $\pm$ 3	7 $\pm$ 4
Minimum Basal Area of Trees $\geq$ 5" dbh (Ft^2/Acre) [4/ 5/]	60	94 $\pm$ 17	120 $\pm$ 17	147 $\pm$ 19
DBH Variation in Trees $\geq$ 9" dbh [2/]	M	42 tpa 9-12.9" dbh 13 tpa 13-16.9" dbh 3 tpa 17-20.9" dbh 3 tpa 21-24.9" dbh 3 tpa 25"+ dbh	57 tpa 9-12.9" dbh 24 tpa 13-16.9" dbh 15 tpa 17-20.9" dbh 5 tpa 21-24.9" dbh 1 tpa 25"+ dbh	54 tpa 9-12.9" dbh 34 tpa 13-16.9" dbh 15 tpa 17-20.9" dbh 5 tpa 21-24.9" dbh 2 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees $\geq$ 9" dbh [1/]	12 3-23			
Probability of Down Woody $\geq$ 9" dbh [2/]	L – M	No Data	No Data	No Data
Percent of Trees $\geq$ 9" DBH With Decay[1/]	5 0-11			
Number of Snags $\geq$ 9" DBH Per Acre	6 0-22	19	8	8
Number of Canopy Layers [3/]	Single			

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3/ Not a minimum criteria. Number of canopy layers can vary within an old growth type with age, relative abundance of different species and successional stage.
4/ In Old Growth Type 3, 60 ft^2 applies to habitat type group E for LP, 70 ft^2 of basal area applies to habitat type group C for LP and habitat type group H for ES,AF,WBP, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 3 .

5/ In Old Growth Type 5, 70 ft^2 applies to habitat type group H for SAF, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 5 .

* Green, P., Joy, J., Sirucek, D., Hann, W., Zack, A., Naumann, B. 1992 (*errata corrected 02/05*). Old-Growth Forest Types of the Northern Region. In Our Approach to Sustaining Ecological Systems. USDA Forest Service, Northern Region, Missoula MT

(Page 2 of 2 for this stand)

Stand ID: 33202009 (Parent Stands 33202001, 33202002, 33202003, 33202008, 33202009)
Initial Exam Date: Aug 1985 for all parent stands
Monitoring Exam Date: Jul 2006
Treatment: 2000 Shelterwood Preparatory Cut
Habitat Type:261 Forest Type: DF
Old Growth Habitat Type Group*: B Old Growth Type*: 1

Old Growth Characteristic*	Initial Exam 33202008	Initial Exam 33202009	2006 Monitoring Exam
Minimum Age of Large Trees	141-148	158-197	105-128
Minimum Number of Trees per Acre Larger than a Specified Diameter	7 ± 5	22 ± 12	3 ± 2
Minimum Basal Area of Trees ≥ 5" dbh (Ft^2/Acre) [4/ 5/]	80 ± 26	165 ± 39	138 ± 16
DBH Variation in Trees ≥ 9" dbh [2/]	28 tpa 9-12.9" dbh 22 tpa 13-16.9" dbh 6 tpa 17-20.9" dbh 5 tpa 21-24.9" dbh 2 tpa 25"+ dbh	25 tpa 9-12.9" dbh 40 tpa 13-16.9" dbh 8 tpa 17-20.9" dbh 16 tpa 21-24.9" dbh 6 tpa 25"+ dbh	29 tpa 9-12.9" dbh 54 tpa 13-16.9" dbh 14 tpa 17-20.9" dbh 3 tpa 21-24.9" dbh 0 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees ≥ 9" dbh [1/]		0% 0/96	0% 0/100
Probability of Down Woody ≥ 9" dbh [2/]	No Data	No Data	Avg 1.2 pieces/transect 6 of 10 plots with pieces
Percent of Trees ≥ 9" DBH With Decay [1/]		3% 2.7/96	3% 3.1/100
Number of Snags ≥ 9" DBH Per Acre	0	11	10
Number of Canopy Layers [3/]			Multiple

Old Growth Monitoring Stand Summary

Stand ID: 40106003
Initial Exam Date: Nov 1987
Monitoring Exam Date: Aug 2006
Treatment: 2004 Improvement Cut
Habitat Type:262 Forest Type: PP
Old Growth Habitat Type Group*: B Old Growth Type*: 1

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam	2006 Monitoring Exam
Minimum Age of Large Trees	170	180-180	59
Minimum Number of Trees per Acre Larger than a Specified Diameter	8 tpa $\geq$ 21" dbh	8 $\pm$ 4	1 $\pm$ 1
Minimum Basal Area of Trees $\geq$ 5" dbh (Ft^2/Acre) [4/ 5/]	60	87 $\pm$ 13	80 $\pm$ 16
DBH Variation in Trees $\geq$ 9" dbh [2/]	M	0 tpa 9-12.9" dbh 20 tpa 13-16.9" dbh 19 tpa 17-20.9" dbh 6 tpa 21-24.9" dbh 2 tpa 25"+ dbh	66 tpa 9-12.9" dbh 18 tpa 13-16.9" dbh 8 tpa 17-20.9" dbh 1 tpa 21-24.9" dbh 0 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees $\geq$ 9" dbh [1/]	12 3-23	0% 0/48	0% 0/93
Probability of Down Woody $\geq$ 9" dbh [2/]	L – M	No Data	Avg 0.6 pieces/transect 3 of 10 plots with pieces
Percent of Trees $\geq$ 9" DBH With Decay [1/]	5 0-11	0% 0/48	0% 0/93
Number of Snags $\geq$ 9" DBH Per Acre	6 0-22	0	3
Number of Canopy Layers [3/]	Single		Single

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3/ Not a minimum criteria. Number of canopy layers can vary within an old growth type with age, relative abundance of different species and successional stage.
4/ In Old Growth Type 3, 60 ft^2 applies to habitat type group E for LP, 70 ft^2 of basal area applies to habitat type group C for LP and habitat type group H for ES,AF,WBP, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 3 .
5/ In Old Growth Type 5, 70 ft^2 applies to habitat type group H for SAF, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 5 .

* Green, P., Joy, J., Sirucek, D., Hann, W., Zack, A., Naumann, B. 1992 (*errata corrected 02/05*). Old-Growth Forest Types of the Northern Region. In Our Approach to Sustaining Ecological Systems. USDA Forest Service, Northern Region, Missoula MT

Old Growth Monitoring Stand Summary

Stand ID: 40806058
Initial Exam Date: Nov 1981
Monitoring Exam Date: Aug 2006
Treatment: 1997 Ecosystem Burn
Habitat Type:260 Forest Type: PP
Old Growth Habitat Type Group*: B Old Growth Type*: 1

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam	2006 Monitoring Exam
Minimum Age of Large Trees	170	199-300	197-437
Minimum Number of Trees per Acre Larger than a Specified Diameter	8 tpa ≥ 21" dbh	9 ± 2	9 ± 3
Minimum Basal Area of Trees ≥ 5" dbh (Ft^2/Acre) [4/ 5/]	60	97 ± 13	68 ± 12
DBH Variation in Trees ≥ 9" dbh [2/]	M	20 tpa 9-12.9" dbh 11 tpa 13-16.9" dbh 12 tpa 17-20.9" dbh 3 tpa 21-24.9" dbh 7 tpa 25"+ dbh	10 tpa 9-12.9" dbh 15 tpa 13-16.9" dbh 2 tpa 17-20.9" dbh 4 tpa 21-24.9" dbh 6 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees ≥ 9" dbh [1/]	12 3-23	1% 0.6/52	4% 1.3/36
Probability of Down Woody ≥ 9" dbh [2/]	L – M	No Data	Avg 0.3 pieces/transect 2 of 10 plots with pieces
Percent of Trees ≥ 9" DBH With Decay [1/]	5 0-11	0% 0/52	5% 1.9/36
Number of Snags ≥ 9" DBH Per Acre	6 0-22	2	3
Number of Canopy Layers [3/]	Single		Multiple

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2/ These are not minimum criteria. They are Low, Moderate, and High probabilities of abundant large down woody material or variation in diameters based on stand condition expected to occur most frequently.
3/ Not a minimum criteria. Number of canopy layers can vary within an old growth type with age, relative abundance of different species and successional stage.
4/ In Old Growth Type 3, 60 ft^2 applies to habitat type group E for LP, 70 ft^2 of basal area applies to habitat type group C for LP and habitat type group H for ES,AF,WBP, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 3 .
5/ In Old Growth Type 5, 70 ft^2 applies to habitat type group H for SAF, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 5 .

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Old Growth Monitoring Stand Summary

Stand ID: 40806062
Initial Exam Date: Nov 1981
Monitoring Exam Date: Aug 2006
Treatment: 1997 Ecosystem Burn
Habitat Type:282 Forest Type: PP
Old Growth Habitat Type Group*: B Old Growth Type*: 1

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam	2006 Monitoring Exam
Minimum Age of Large Trees	170	246-280	195-475
Minimum Number of Trees per Acre Larger than a Specified Diameter	8 tpa ≥ 21" dbh	10 ± 2	12 ± 2
Minimum Basal Area of Trees ≥ 5" dbh (Ft^2/Acre) [4/ 5/]	60	76 ± 14	102 ± 16
DBH Variation in Trees ≥ 9" dbh [2/]	M	14 tpa 9-12.9" dbh 12 tpa 13-16.9" dbh 6 tpa 17-20.9" dbh 5 tpa 21-24.9" dbh 6 tpa 25"+ dbh	26 tpa 9-12.9" dbh 13 tpa 13-16.9" dbh 10 tpa 17-20.9" dbh 7 tpa 21-24.9" dbh 6 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees ≥ 9" dbh [1/]	12 3-23	7% 2.8/42	10% 6.1/60
Probability of Down Woody ≥ 9" dbh [2/]	L – M	No Data	Avg 0.7 pieces/transect 7 of 10 plots with pieces
Percent of Trees ≥ 9" DBH With Decay [1/]	5 0-11	0% 0/42	8% 4.5/60
Number of Snags ≥ 9" DBH Per Acre	6 0-22	3	3
Number of Canopy Layers [3/]	Single		Multiple

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2/ These are not minimum criteria. They are Low, Moderate, and High probabilities of abundant large down woody material or variation in diameters based on stand condition expected to occur most frequently.
3/ Not a minimum criteria. Number of canopy layers can vary within an old growth type with age, relative abundance of different species and successional stage.
4/ In Old Growth Type 3, 60 ft^2 applies to habitat type group E for LP, 70 ft^2 of basal area applies to habitat type group C for LP and habitat type group H for ES,AF,WBP, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 3 .
5/ In Old Growth Type 5, 70 ft^2 applies to habitat type group H for SAF, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 5 .

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Old Growth Monitoring Stand Summary

Stand ID: 40806099
Initial Exam Date: Oct 1981, Nov 1981
Monitoring Exam Date: Jul 2006
Treatment: 1997 Ecosystem Burn
Habitat Type:321 Forest Type: DF
Old Growth Habitat Type Group*: A Old Growth Type*: 1

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam Oct 1981	Initial Exam Nov 1981	2006 Monitoring Exam
Minimum Age of Large Trees	170	243-500	200-222	212-320
Minimum Number of Trees per Acre Larger than a Specified Diameter	8 tpa ≥ 21" dbh	18 ± 3	9 ± 3	15 ± 3
Minimum Basal Area of Trees ≥ 5" dbh (Ft^2/Acre) 4/ 5/	60	113 ± 21	128 ± 53	97 ± 10
DBH Variation in Trees ≥ 9" dbh 2/	M	0 tpa 9-12.9" dbh 5 tpa 13-16.9" dbh 16 tpa 17-20.9" dbh 9 tpa 21-24.9" dbh 9 tpa 25"+ dbh	89 tpa 9-12.9" dbh 7 tpa 13-16.9" dbh 4 tpa 17-20.9" dbh 7 tpa 21-24.9" dbh 3 tpa 25"+ dbh	19 tpa 9-12.9" dbh 8 tpa 13-16.9" dbh 6 tpa 17-20.9" dbh 7 tpa 21-24.9" dbh 7 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees ≥ 9" dbh 1/	12 3-23	0% 0/39		2% 1.1/48
Probability of Down Woody ≥ 9" dbh 2/	L – M	No Data	No Data	Avg 0.6 pieces/transect 7 of 14 plots with pieces
Percent of Trees ≥ 9" DBH With Decay 1/	5 0-11	1% 0.3/39		4% 2.0/48
Number of Snags ≥ 9" DBH Per Acre	6 0-22	1	6	4
Number of Canopy Layers 3/	Single			Two

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2/ These are not minimum criteria. They are Low, Moderate, and High probabilities of abundant large down woody material or variation in diameters based on stand condition expected to occur most frequently.
3/ Not a minimum criteria. Number of canopy layers can vary within an old growth type with age, relative abundance of different species and successional stage.
4/ In Old Growth Type 3, 60 ft^2 applies to habitat type group E for LP, 70 ft^2 of basal area applies to habitat type group C for LP and habitat type group H for ES,AF,WBP, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 3 .

5/ In Old Growth Type 5, 70 ft^2 applies to habitat type group H for SAF, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 5 .

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Old Growth Monitoring Stand Summary

Stand ID: 42603046
Initial Exam Date: Nov 1981, Jun 1993
Monitoring Exam Date: Aug 2006
Treatment: 2000 Improvement Cut
Habitat Type:283 Forest Type: PP
Old Growth Habitat Type Group*: C Old Growth Type*: 2

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam Nov 1981	Initial Exam Jun 1993	2006 Monitoring Exam
Minimum Age of Large Trees	170	210-250	150-160	246-294
Minimum Number of Trees per Acre Larger than a Specified Diameter	8 tpa $\geq$ 21" dbh	9 $\pm$ 2	15 $\pm$ 4	5 $\pm$ 2
Minimum Basal Area of Trees $\geq$ 5" dbh (Ft^2/Acre) [4/ 5/]	80	78 $\pm$ 13	134 $\pm$ 23	66 $\pm$ 19
DBH Variation in Trees $\geq$ 9" dbh [2/]	H	18 tpa 9-12.9" dbh 18 tpa 13-16.9" dbh 8 tpa 17-20.9" dbh 9 tpa 21-24.9" dbh 0 tpa 25"+ dbh	25 tpa 9-12.9" dbh 30 tpa 13-16.9" dbh 8 tpa 17-20.9" dbh 12 tpa 21-24.9" dbh 2 tpa 25"+ dbh	2 tpa 9-12.9" dbh 18 tpa 13-16.9" dbh 11 tpa 17-20.9" dbh 4 tpa 21-24.9" dbh 2 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees $\geq$ 9" dbh [1/]	11 0-21		0% 0/78	4% 1.5/36
Probability of Down Woody $\geq$ 9" dbh [2/]	M	No Data	No Data	Avg 0.4 pieces/ transect 4 of 10 plots with pieces
Percent of Trees $\geq$ 9" DBH With Decay[1/]	5 2-12		8% 5.9/78	8% 3.0/36
Number of Snags $\geq$ 9" DBH Per Acre	7 2-37	11	18	4
Number of Canopy Layers [3/]	Single/Multiple			Multiple

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3/ Not a minimum criteria. Number of canopy layers can vary within an old growth type with age, relative abundance of different species and successional stage.
4/ In Old Growth Type 3, 60 ft^2 applies to habitat type group E for LP, 70 ft^2 of basal area applies to habitat type group C for LP and habitat type group H for ES,AF,WBP, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 3 .

5/ In Old Growth Type 5, 70 ft^2 applies to habitat type group H for SAF, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 5 .

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Old Growth Monitoring Stand Summary
(Page 1 of 2 for this stand)

Stand ID: 42704006 (Parents 42704006, 42704007, 42704008)
Initial Exam Date: Aug 1983, Nov 1987, Nov 1987 respectively
Monitoring Exam Date: Sep 2006
Treatment: 1997 Individual Tree Selection Cut, 1998 Ecosystem Burn
Habitat Type:321 Forest Type: PP
Old Growth Habitat Type Group*: A Old Growth Type*: 1

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam 42704006	Initial Exam 42704007
Minimum Age of Large Trees	170	180-180	153-180
Minimum Number of Trees per Acre Larger than a Specified Diameter	8 tpa ≥ 21" dbh	16 ± 6	16 ± 6
Minimum Basal Area of Trees ≥ 5" dbh (Ft^2/Acre) [4/ 5/]	60	156 ± 23	127 ± 12
DBH Variation in Trees ≥ 9" dbh [2/]	M	0 tpa 9-12.9" dbh 14 tpa 13-16.9" dbh 38 tpa 17-20.9" dbh 8 tpa 21-24.9" dbh 9 tpa 25"+ dbh	8 tpa 9-12.9" dbh 12 tpa 13-16.9" dbh 17 tpa 17-20.9" dbh 13 tpa 21-24.9" dbh 3 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees ≥ 9" dbh [1/]	12 3-23	2% 1.2/68	
Probability of Down Woody ≥ 9" dbh [2/]	L – M	No 9"+ Sampled	No Data
Percent of Trees ≥ 9" DBH With Decay [1/]	5 0-11	0% 0/68	
Number of Snags ≥ 9" DBH Per Acre	6 0-22	8	0
Number of Canopy Layers [3/]	Single		

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2/ These are not minimum criteria. They are Low, Moderate, and High probabilities of abundant large down woody material or variation in diameters based on stand condition expected to occur most frequently.
3/ Not a minimum criteria. Number of canopy layers can vary within an old growth type with age, relative abundance of different species and successional stage.
4/ In Old Growth Type 3, 60 ft^2 applies to habitat type group E for LP, 70 ft^2 of basal area applies to habitat type group C for LP and habitat type group H for ES,AF,WBP, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 3 .
5/ In Old Growth Type 5, 70 ft^2 applies to habitat type group H for SAF, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 5 .

* Green, P., Joy, J., Sirucek, D., Hann, W., Zack, A., Naumann, B. 1992 (*errata corrected 02/05*). Old-Growth Forest Types of the Northern Region. In Our Approach to Sustaining Ecological Systems. USDA Forest Service, Northern Region, Missoula MT

(Page 2 of 2 for this stand)

Stand ID: 42704006 (Parents 42704006, 42704007, 42704008)
Initial Exam Date: Aug 1983, Nov 1987, Nov 1987 respectively
Monitoring Exam Date: Sep 2006
Treatment: 1997 Individual Tree Selection Cut, 1998 Ecosystem Burn
Habitat Type:321 Forest Type: PP
Old Growth Habitat Type Group*: A Old Growth Type*: 1

Old Growth Characteristic*	**Initial Exam 42704008**	**2006 Monitoring Exam**
Minimum Age of Large Trees	180	192-235
Minimum Number of Trees per Acre Larger than a Specified Diameter	10 ± 4	1 ± 1
Minimum Basal Area of Trees ≥ 5" dbh (Ft^2/Acre) [4/ 5/]	113 ± 21	6 ± 4
DBH Variation in Trees ≥ 9" dbh [2/]	57 tpa 9-12.9" dbh 16 tpa 13-16.9" dbh 11 tpa 17-20.9" dbh 6 tpa 21-24.9" dbh 4 tpa 25"+ dbh	0 tpa 9-12.9" dbh 0 tpa 13-16.9" dbh 1 tpa 17-20.9" dbh 1 tpa 21-24.9" dbh 0 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees ≥ 9" dbh [1/]		0% 0/2
Probability of Down Woody ≥ 9" dbh [2/]	No Data	Avg 0.7 pieces/transect 3 of 10 plots with pieces
Percent of Trees ≥ 9" DBH With Decay [1/]		40% 0.8/2
Number of Snags ≥ 9" DBH Per Acre	7	9
Number of Canopy Layers [3/]		Single

Old Growth Monitoring Stand Summary

Stand ID: 50201040
Initial Exam Date: Nov 1981
Monitoring Exam Date: Jun 2006
Treatment: 1975 Individual Tree Selection, 1996 Improvement Cut, 1997 Ecosystem Burn
Habitat Type:290 Forest Type: PP
Old Growth Habitat Type Group*: G Old Growth Type*: 5

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam	2006 Monitoring Exam
Minimum Age of Large Trees	180	164-290	201-401
Minimum Number of Trees per Acre Larger than a Specified Diameter	10 tpa $\geq$ 17" dbh	11 $\pm$ 3	19 $\pm$ 4
Minimum Basal Area of Trees $\geq$ 5" dbh (Ft^2/Acre) [4/ 5/]	70/80	103 $\pm$ 12	106 $\pm$ 15
DBH Variation in Trees $\geq$ 9" dbh [2/]	M	37 tpa 9-12.9" dbh 21 tpa 13-16.9" dbh 3 tpa 17-20.9" dbh 5 tpa 21-24.9" dbh 4 tpa 25"+ dbh	8 tpa 9-12.9" dbh 20 tpa 13-16.9" dbh 5 tpa 17-20.9" dbh 7 tpa 21-24.9" dbh 9 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees $\geq$ 9" dbh [1/]	9 1-18	0% 0/69	1% 0.4/47
Probability of Down Woody $\geq$ 9" dbh [2/]	H	No Data	Avg 0.3 pieces/transect 3 of 10 plots with pieces
Percent of Trees $\geq$ 9" DBH With Decay [1/]	6 0-12	0% 0/69	3% 1.5/47
Number of Snags $\geq$ 9" DBH Per Acre	12 3-36	1	2
Number of Canopy Layers [3/]	Multiple		Multiple

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2/ These are not minimum criteria. They are Low, Moderate, and High probabilities of abundant large down woody material or variation in diameters based on stand condition expected to occur most frequently.
3/ Not a minimum criteria. Number of canopy layers can vary within an old growth type with age, relative abundance of different species and successional stage.
4/ In Old Growth Type 3, 60 ft^2 applies to habitat type group E for LP, 70 ft^2 of basal area applies to habitat type group C for LP and habitat type group H for ES,AF,WBP, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 3 .
5/ In Old Growth Type 5, 70 ft^2 applies to habitat type group H for SAF, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 5 .

* Green, P., Joy, J., Sirucek, D., Hann, W., Zack, A., Naumann, B. 1992 (*errata corrected 02/05*). Old-Growth Forest Types of the Northern Region. In Our Approach to Sustaining Ecological Systems. USDA Forest Service, Northern Region, Missoula MT

Old Growth Monitoring Stand Summary

Stand ID: 50205098
Initial Exam Date: Jun 1987
Monitoring Exam Date: Jun 2005
Treatment: 1997 Improvement Cut
Habitat Type:591 Forest Type: DF
Old Growth Habitat Type Group*: G Old Growth Type*: 5

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam	2006 Monitoring Exam
Minimum Age of Large Trees	180	181-250	213-320
Minimum Number of Trees per Acre Larger than a Specified Diameter	10 tpa ≥ 17" dbh	15 ± 5	14 ± 4
Minimum Basal Area of Trees ≥ 5" dbh (Ft^2/Acre) [4/ 5/]	70/80	160 ± 21	106 ± 14
DBH Variation in Trees ≥ 9" dbh [2/]	M	87 tpa 9-12.9" dbh 17 tpa 13-16.9" dbh 5 tpa 17-20.9" dbh 6 tpa 21-24.9" dbh 4 tpa 25"+ dbh	28 tpa 9-12.9" dbh 29 tpa 13-16.9" dbh 2 tpa 17-20.9" dbh 10 tpa 21-24.9" dbh 2 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees ≥ 9" dbh [1/]	9 1-18	0% 0/120	0% 0/72
Probability of Down Woody ≥ 9" dbh [2/]	H	No Data	No Data
Percent of Trees ≥ 9" DBH With Decay [1/]	6 0-12	11% 12.7/120	2% 1.4/72
Number of Snags ≥ 9" DBH Per Acre	12 3-36	7	1
Number of Canopy Layers [3/]	Multiple		Two

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3/ Not a minimum criteria. Number of canopy layers can vary within an old growth type with age, relative abundance of different species and successional stage.
4/ In Old Growth Type 3, 60 ft^2 applies to habitat type group E for LP, 70 ft^2 of basal area applies to habitat type group C for LP and habitat type group H for ES,AF,WBP, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 3 .
5/ In Old Growth Type 5, 70 ft^2 applies to habitat type group H for SAF, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 5 .

* Green, P., Joy, J., Sirucek, D., Hann, W., Zack, A., Naumann, B. 1992 (*errata corrected 02/05*). Old-Growth Forest Types of the Northern Region. In Our Approach to Sustaining Ecological Systems. USDA Forest Service, Northern Region, Missoula MT

Old Growth Monitoring Stand Summary

Stand ID: 51301040
Initial Exam Date: Sep 1985
Monitoring Exam Date: Aug 2006
Treatment: 1998-2002 Improvement Cut, 2005 Underburn
Habitat Type:320 Forest Type: DF
Old Growth Habitat Type Group*: C Old Growth Type*: 2

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam	2006 Monitoring Exam
Minimum Age of Large Trees	170	200-214	167-292
Minimum Number of Trees per Acre Larger than a Specified Diameter	8 tpa $\geq$ 21" dbh	8 $\pm$ 4	12 $\pm$ 3
Minimum Basal Area of Trees $\geq$ 5" dbh (Ft^2/Acre) [4/ 5/]	80	111 $\pm$ 18	114 $\pm$ 16
DBH Variation in Trees $\geq$ 9" dbh [2/]	H	42 tpa 9-12.9" dbh 10 tpa 13-16.9" dbh 3 tpa 17-20.9" dbh 0 tpa 21-24.9" dbh 8 tpa 25"+ dbh	17 tpa 9-12.9" dbh 17 tpa 13-16.9" dbh 14 tpa 17-20.9" dbh 6 tpa 21-24.9" dbh 7 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees $\geq$ 9" dbh [1/]	11 0-21	0% 0/63	5% 3.0/59
Probability of Down Woody $\geq$ 9" dbh [2/]	M	No Data	Avg 0.6 pieces/transect 5 of 10 plots with pieces
Percent of Trees $\geq$ 9" DBH With Decay [1/]	5 2-12	0% 0/63	2% 0.9/59
Number of Snags $\geq$ 9" DBH Per Acre	7 2-37	6	1
Number of Canopy Layers [3/]	Single/Multiple		Two

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4/ In Old Growth Type 3, 60 ft^2 applies to habitat type group E for LP, 70 ft^2 of basal area applies to habitat type group C for LP and habitat type group H for ES,AF,WBP, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 3 .
5/ In Old Growth Type 5, 70 ft^2 applies to habitat type group H for SAF, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 5 .

* Green, P., Joy, J., Sirucek, D., Hann, W., Zack, A., Naumann, B. 1992 (*errata corrected 02/05*). Old-Growth Forest Types of the Northern Region. In Our Approach to Sustaining Ecological Systems. USDA Forest Service, Northern Region, Missoula MT

Old Growth Monitoring Stand Summary

Stand ID: 51304036
Initial Exam Date: Oct 1991
Monitoring Exam Date: Jun 2006
Treatment: 2003 Individual Tree Selection, 2005 Underburn
Habitat Type:312 Forest Type: DF
Old Growth Habitat Type Group*: B Old Growth Type*: 1

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam	2006 Monitoring Exam
Minimum Age of Large Trees	170	142-280	138-300
Minimum Number of Trees per Acre Larger than a Specified Diameter	8 tpa ≥ 21" dbh	9 ± 4	5 ± 2
Minimum Basal Area of Trees ≥ 5" dbh (Ft^2/Acre) [4/ 5/]	60	144 ± 25	92 ± 14
DBH Variation in Trees ≥ 9" dbh [2/]	M	53 tpa 9-12.9" dbh 10 tpa 13-16.9" dbh 13 tpa 17-20.9" dbh 4 tpa 21-24.9" dbh 5 tpa 25"+ dbh	30 tpa 9-12.9" dbh 24 tpa 13-16.9" dbh 9 tpa 17-20.9" dbh 4 tpa 21-24.9" dbh 2 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees ≥ 9" dbh [1/]	12 3-23	2% 1.3/85	3% 1.9/68
Probability of Down Woody ≥ 9" dbh [2/]	L – M	No Data	Avg 0.9 pieces/transect 6 of 10 plots with pieces
Percent of Trees ≥ 9" DBH With Decay [1/]	5 0-11	5% 4.5/85	3% 1.8/68
Number of Snags ≥ 9" DBH Per Acre	6 0-22	28	5
Number of Canopy Layers [3/]	Single		Single

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3/ Not a minimum criteria. Number of canopy layers can vary within an old growth type with age, relative abundance of different species and successional stage.
4/ In Old Growth Type 3, 60 ft^2 applies to habitat type group E for LP, 70 ft^2 of basal area applies to habitat type group C for LP and habitat type group H for ES,AF,WBP, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 3 .
5/ In Old Growth Type 5, 70 ft^2 applies to habitat type group H for SAF, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 5 .

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Old Growth Monitoring Stand Summary

Stand ID: 53302005
Initial Exam Date: Sep 1992
Monitoring Exam Date: May 2006
Treatment: 2004 Improvement Cut, 2005 Underburn
Habitat Type:262 Forest Type: DF
Old Growth Habitat Type Group*: B Old Growth Type*: 1

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam	2006 Monitoring Exam
Minimum Age of Large Trees	170	193-320	152-250
Minimum Number of Trees per Acre Larger than a Specified Diameter	8 tpa $\geq$ 21" dbh	10 $\pm$ 4	5 $\pm$ 1
Minimum Basal Area of Trees $\geq$ 5" dbh (Ft^2/Acre) [4/ 5/]	60	134 $\pm$ 15	80 $\pm$ 12
DBH Variation in Trees $\geq$ 9" dbh [2/]	M	66 tpa 9-12.9" dbh 27 tpa 13-16.9" dbh 5 tpa 17-20.9" dbh 6 tpa 21-24.9" dbh 4 tpa 25"+ dbh	26 tpa 9-12.9" dbh 21 tpa 13-16.9" dbh 10tpa 17-20.9" dbh 3 tpa 21-24.9" dbh 2 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees $\geq$ 9" dbh [1/]	12 3-23	1% 1.6/109	2% 1/62
Probability of Down Woody $\geq$ 9" dbh [2/]	L – M	No Data	Avg 0.6 pieces/transect 4 of 10 plots with pieces
Percent of Trees $\geq$ 9" DBH With Decay [1/]	5 0-11	0% 0/109	2% 1.8/62
Number of Snags $\geq$ 9" DBH Per Acre	6 0-22	3	7
Number of Canopy Layers [3/]	Single		Two

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3/ Not a minimum criteria. Number of canopy layers can vary within an old growth type with age, relative abundance of different species and successional stage.
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5/ In Old Growth Type 5, 70 ft^2 applies to habitat type group H for SAF, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 5 .

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Old Growth Monitoring Stand Summary

Stand ID: 61201063
Initial Exam Date: Jul 1980
Monitoring Exam Date: Jul 2006
Treatment: 1996 Improvement Cut
Habitat Type:625 Forest Type: L
Old Growth Habitat Type Group*: E Old Growth Type*: 4

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam	2006 Monitoring Exam
Minimum Age of Large Trees	180	231-360	240-344
Minimum Number of Trees per Acre Larger than a Specified Diameter	10 tpa ≥ 21" dbh	17 ± 5	14 ± 3
Minimum Basal Area of Trees ≥ 5" dbh (Ft^2/Acre) [4/ 5/]	80	127 ± 30	118 ± 15
DBH Variation in Trees ≥ 9" dbh [2/]	H	25 tpa 9-12.9" dbh 6 tpa 13-16.9" dbh 21 tpa 17-20.9" dbh 12 tpa 21-24.9" dbh 6 tpa 25"+ dbh	2 tpa 9-12.9" dbh 18 tpa 13-16.9" dbh 14 tpa 17-20.9" dbh 6 tpa 21-24.9" dbh 8 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees ≥ 9" dbh [1/]	9 0-19	0% 0/69	1% 0.4/48
Probability of Down Woody ≥ 9" dbh [2/]	H	No Data	Avg 1.6 pieces/transect 7 of 10 plots with pieces
Percent of Trees ≥ 9" DBH With Decay [1/]	9 1-31	3% 2.1/69	9% 4.5/48
Number of Snags ≥ 9" DBH Per Acre	15 2-43	1	2
Number of Canopy Layers [3/]	Single/Multiple		Two

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5/ In Old Growth Type 5, 70 ft^2 applies to habitat type group H for SAF, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 5 .

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Old Growth Monitoring Stand Summary

Stand ID: 61201078
Initial Exam Date: May 1992
Monitoring Exam Date: Jul 2006
Treatment: 2003 Improvement Cut
Habitat Type:620 Forest Type: L
Old Growth Habitat Type Group*: E Old Growth Type*: 4

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam	2006 Monitoring Exam
Minimum Age of Large Trees	180	154-400	229-496
Minimum Number of Trees per Acre Larger than a Specified Diameter	10 tpa ≥ 21" dbh	12 ± 7	17 ± 5
Minimum Basal Area of Trees ≥ 5" dbh (Ft^2/Acre) [4/ 5/]	80	200 ± 25	120 ± 24
DBH Variation in Trees ≥ 9" dbh [2/]	H	100 tpa 9-12.9" dbh 28 tpa 13-16.9" dbh 12 tpa 17-20.9" dbh 3 tpa 21-24.9" dbh 10 tpa 25"+ dbh	7 tpa 9-12.9" dbh 8 tpa 13-16.9" dbh 6 tpa 17-20.9" dbh 6 tpa 21-24.9" dbh 13 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees ≥ 9" dbh [1/]	9 0-19	0% 0/152	0% 0/37
Probability of Down Woody ≥ 9" dbh [2/]	H	No Data	Avg 2.5 pieces/transect 7 of 10 plots with pieces
Percent of Trees ≥ 9" DBH With Decay [1/]	9 1-31	0% 0/152	147% 7.5/37
Number of Snags ≥ 9" DBH Per Acre	15 2-43	0	7
Number of Canopy Layers [3/]	Single/Multiple		Single

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Old Growth Monitoring Stand Summary

Stand ID: 61204008
Initial Exam Date: Jun 1986
Monitoring Exam Date: Jul 2006
Treatment: 1997 Improvement Cut, 2001 Ecosystem Burn
Habitat Type:640 Forest Type: L
Old Growth Habitat Type Group*: H Old Growth Type*: 5

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam	2006 Monitoring Exam
Minimum Age of Large Trees	180	232-368	110-321
Minimum Number of Trees per Acre Larger than a Specified Diameter	10 tpa ≥ 17" dbh	26 ± 7	26 ± 4
Minimum Basal Area of Trees ≥ 5" dbh (Ft^2/Acre) [4/ 5/]	70/80	110 ± 13	114 ± 8
DBH Variation in Trees ≥ 9" dbh [2/]	M	32 tpa 9-12.9" dbh 4 tpa 13-16.9" dbh 12 tpa 17-20.9" dbh 8 tpa 21-24.9" dbh 5 tpa 25"+ dbh	19 tpa 9-12.9" dbh 22 tpa 13-16.9" dbh 10 tpa 17-20.9" dbh 10 tpa 21-24.9" dbh 6 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees ≥ 9" dbh [1/]	9 1-18	2% 1.3/61	2% 1.3/66
Probability of Down Woody ≥ 9" dbh [2/]	H	No Data	Avg 0.7 pieces/transect 5 of 10 plots with pieces
Percent of Trees ≥ 9" DBH With Decay [1/]	6 0-12	0% 0/61	4% 2.6/66
Number of Snags ≥ 9" DBH Per Acre	12 3-36	0	1
Number of Canopy Layers [3/]	Multiple		Two

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Old Growth Monitoring Stand Summary

Stand ID: 74402084
Initial Exam Date: Sep 1977
Monitoring Exam Date: Jun 2006
Treatment: 2000 Improvement Cut
Habitat Type:260 Forest Type: PP
Old Growth Habitat Type Group*: B Old Growth Type*: 1

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam	2006 Monitoring Exam
Minimum Age of Large Trees	170	140-300	137-170
Minimum Number of Trees per Acre Larger than a Specified Diameter	8 tpa $\geq$ 21" dbh	14 $\pm$ 4	12 $\pm$ 3
Minimum Basal Area of Trees $\geq$ 5" dbh (Ft^2/Acre) [4/ 5/]	60	170 $\pm$ 15	102 $\pm$ 12
DBH Variation in Trees $\geq$ 9" dbh [2/]	M	50 tpa 9-12.9" dbh 39 tpa 13-16.9" dbh 20 tpa 17-20.9" dbh 10 tpa 21-24.9" dbh 4 tpa 25"+ dbh	18 tpa 9-12.9" dbh 17 tpa 13-16.9" dbh 9 tpa 17-20.9" dbh 10 tpa 21-24.9" dbh 3 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees $\geq$ 9" dbh [1/]	12 3-23	0% 0/123	7% 3.7/55
Probability of Down Woody $\geq$ 9" dbh [2/]	L – M	No Data	Avg 0.2 pieces/transect 2 of 10 plots with pieces
Percent of Trees $\geq$ 9" DBH With Decay [1/]	5 0-11	2% 2.2/123	5% 2.5/55
Number of Snags $\geq$ 9" DBH Per Acre	6 0-22	5	1
Number of Canopy Layers [3/]	Single		Two

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2/ These are not minimum criteria. They are Low, Moderate, and High probabilities of abundant large down woody material or variation in diameters based on stand condition expected to occur most frequently.
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* Green, P., Joy, J., Sirucek, D., Hann, W., Zack, A., Naumann, B. 1992 (*errata corrected 02/05*). Old-Growth Forest Types of the Northern Region. In Our Approach to Sustaining Ecological Systems. USDA Forest Service, Northern Region, Missoula MT

Old Growth Monitoring Stand Summary

Stand ID: 76901099 (Parent Stand 76901006)
Initial Exam Date: Sep 1995
Monitoring Exam Date: Jul 2006
Treatment: 2002 Individual Tree Selection
Habitat Type:322 Forest Type: DF
Old Growth Habitat Type Group*: B Old Growth Type*: 1

Old Growth Characteristic*	Old Growth Criteria*	Initial Exam	2006 Monitoring Exam
Minimum Age of Large Trees	170	168-281	161-378
Minimum Number of Trees per Acre Larger than a Specified Diameter	8 tpa ≥ 21" dbh	15 ± 8	11 ± 3
Minimum Basal Area of Trees ≥ 5" dbh (Ft^2/Acre) [4/ 5/]	60	128 ± 19	82 ± 21
DBH Variation in Trees ≥ 9" dbh [2/]	M	55 tpa 9-12.9" dbh 11 tpa 13-16.9" dbh 9 tpa 17-20.9" dbh 8 tpa 21-24.9" dbh 7 tpa 25"+ dbh	7 tpa 9-12.9" dbh 11 tpa 13-16.9" dbh 9 tpa 17-20.9" dbh 4 tpa 21-24.9" dbh 7 tpa 25"+ dbh
Percent Dead/Broken Tops in Trees ≥ 9" dbh [1/]	12 3-23	2% 1.4/89	2% 0.8/37
Probability of Down Woody ≥ 9" dbh [2/]	L – M	No Data	Avg 0.6 pieces/transect 3 of 10 plots with pieces
Percent of Trees ≥ 9" DBH With Decay [1/]	5 0-11	2% 1.5/89	1% 0.5/37
Number of Snags ≥ 9" DBH Per Acre	6 0-22	1	8
Number of Canopy Layers [3/]	Single		Multiple

1/ These values are not minimum criteria. They are the range of means for trees ≥9" DBH across plots within forests, forest types, or habitat type groups.
2/ These are not minimum criteria. They are Low, Moderate, and High probabilities of abundant large down woody material or variation in diameters based on stand condition expected to occur most frequently.
3/ Not a minimum criteria. Number of canopy layers can vary within an old growth type with age, relative abundance of different species and successional stage.
4/ In Old Growth Type 3, 60 ft^2 applies to habitat type group E for LP, 70 ft^2 of basal area applies to habitat type group C for LP and habitat type group H for ES,AF,WBP, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 3 .
5/ In Old Growth Type 5, 70 ft^2 applies to habitat type group H for SAF, 80 ft^2 of basal area applies to all other habitat type and cover type combinations in Old Growth Type 5 .

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